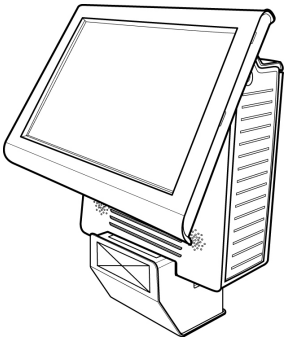
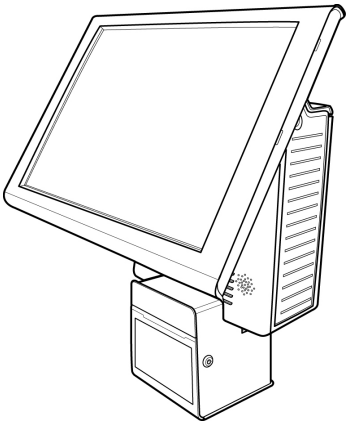
Smart Kiosk

SKI-120 / SKI-150





User's Manual

Revised version 1.0

Preface

About this Manual

Thank you for purchasing our Smart Kiosk Terminal. This terminal offers highly enhanced features, with easy connection to various optional devices for optimal performance. This user manual describes how to setup and connect your terminal.

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Safety notices

Before You Proceed

- Read the safety notices and the User Manual carefully before using the product.
- Keep the box and packaging in case the product needs to be shipped in the future.
- Follow the product and warning label instructions.
- Any changes or modifications that do not follow the instructions in this manual will void this product's warranty.

Power Supply Safety Notes

- To avoid electric shocks, disconnect the power cord from the electrical outlet before relocating the system.
- Make sure the voltage of the power outlet conforms within voltage range of the terminal. Failure to comply may cause the electric shock or damage to the terminal. If you are not sure of the electricity voltage that you are using, contact your local electricity company.
- To avoid fire or electric shocks, do not overload electric power outlets.
- Protect the power cord from being walked on or pinched particularly at plug, convenience receptacles, and the point where they exit from the apparatus.

Preface

Operating Instructions

- Keep this manual for future reference.
- Keep this equipment from moisture and dust.
- Place the equipment on a stable surface before setting it up.
- If there is any of the following situation arise, notify a qualified service technician immediately:
  - The power cord or plug is damaged.
  - Liquid has been spilt on to the equipment.
  - The equipment has been dropped and damaged.
  - The equipment does not function normally.
- Do not block any ventilation openings to prevent the equipment from overheat.
- Do not leave the equipment in a non air-conditioned environment where the storage temperature may go above 70°C (158°F), as this can cause damage to the equipment.

Maintenance

- Gently wipe screen with a clean soft hair lens brush, or a lint-free cloth.
- Do not apply pressure to the screen while cleaning.
- Do not spray any liquid directly onto the screen or the casing of the Smart Kiosk Terminal.
- Chemical cleaners have been reported to cause damage on the screen of the Smart Kiosk Terminal.

Warning and Attention

- The technical descriptions and specifications of the equipment are subject to change without notice.
- For safety reasons, wear gloves when assembling the product.

Patent

Patent pending.

Federal Communications (FCC Statement)

This device complies with FCC Rules Part 15. Operation is subject to the following two conditions:

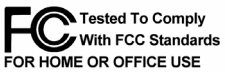
- This device may not cause harmful interference.
- This device must accept any interference received including interference that may cause undesirable operation.

This equipment has been tested and found to comply within the limit of a Class A digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the manufacturer's instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by switching the equipment on and off, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the interference receiving antenna.
- Increase the distance of separation between the equipment and interference receiver.
- Connect the equipment to a power outlet on a circuit different from that to which the interference receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

WARNING:

The use of shielded cables for connection of the monitor to the graphics card is required to assure compliance with FCC regulations. Changes or modifications to this unit not expressly approved by the party responsible for compliance could void the user's authority to operate this equipment.



RoHS

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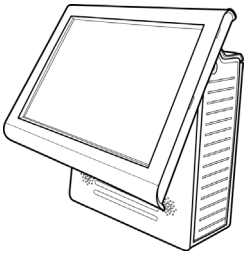
Chapter 1

Welcome

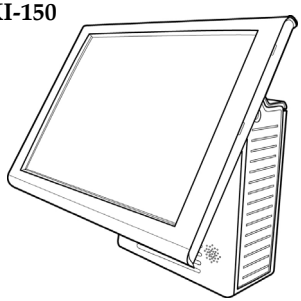
Congratulations on your purchase of this Smart Kiosk. Your easy-to-use Smart Kiosk is designed to help you enhance your business flexibility by offering a superior customer experience.

Overview of Smart Kiosk

SKI-120



SKI-150

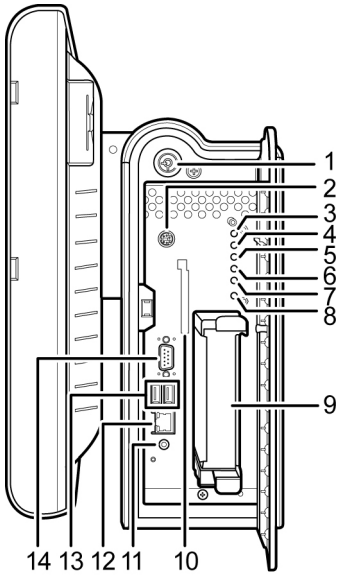


Model	SKI-120		SKI-150	
CPU	VIA Eden 1 GHz (Fanless)	VIA C7 2.0 GHz	VIA Eden 1 GHz (Fanless)	VIA C7 2.0 GHz
Chipset	VIA CN700 + 8237R+			
LCD Panel	12.1″ TFT LCD Panel		15″ TFT LCD Panel	
Touch Screen	12.1″ Resistive Type		15″ Resistive Type	
	12.1″ Capacitive Type		15″ Capacitive Type	
			15″ SAW Type	
HDD	Removable 3.5″ x 1			
Storage devices	CF memory card			
	DOM (Disk On Module)			
Serial Port	6 Serial Ports in total			
USB port	6 USB 2.0 Ports in total			

Note:
See page 19 for detailed specification of your Smart Kiosk.

Side View

The figure below illustrates the components (including input and output ports) located at the right of Smart Kiosk. Open the side panel door to reveal these components.



	DESCRIPTION
1	Key lock for the side panel door
2	PS/2 Keyboard and Mouse port
3	LAN LED
4	HDD LED
5	Power LED
6	5V Standby LED
7	Reset button
8	Power button
9	Removable 3.5″ Hard disk drive
10	CF Card slot
11	Line Out port
12	LAN port
13	USB port x 2
14	COM 3

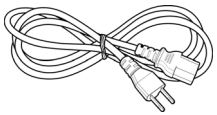
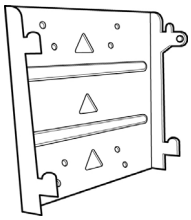
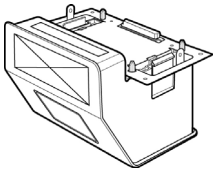
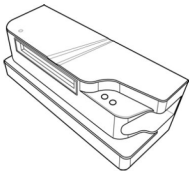
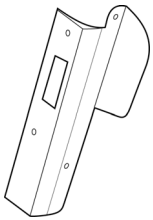
Features

This Smart Kiosk comes equipped with the following features:

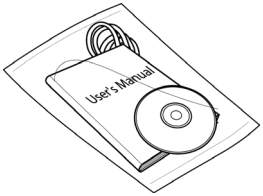
Noise-free	• The fanless, noise free design of the Smart Kiosk is ideal for noise-intolerant environment such as ordering, ticketing, price checker, and self check-in / check-out service.
Low power consumption	• ULV (Ultra Low Voltage) design of the device is embedded with a unique chip set and CPU renders power saving function.
Saving cost of ownership	• Modular design provides the owner with the following benefits: (a) cost effectiveness, (b) customization flexibility, and (c) easy maintenance.
Compact size/ Aesthetic design	• Slimmest in the kiosk industry. This elegant, economic kiosk system features a sleek, compact design base that saves counter space and adds appeal to the service environment.
Dust/water-proof	• Smart Kiosk features a highly durable, rigorously tested design that is reliable and dependable in rugged environments.
WEPOS/WinXP Pro solution	• Solution is recommended to be bundled with embedded solution for high performance and other added values.
Environment protection	• Environmental friendly, RoHS compliant product.
Higher stability	• The Smart Kiosk has a longer overall system MTBF to provide a higher stability during operation.

Unpacking

Before setting up your Smart Kiosk, check that the package contains the following items. If any of the items are missing or damaged, contact your vendor immediately.

Smart Kiosk Terminal	AC Power Cord	Wall Mounting Plate
		
Modular Device (optional) *	**MSR / SCR Module (optional)**	**MSR / SCR Bracket (optional)**
		

Accessory Package



1. Driver CD disc
2. User's Manual
3. Y cable
4. Key
5. Spare screws
6. Wall mounting positioned paper

* The modular device shown above is a laser scanner module (type B), see page 12 for a complete list of available modular devices.

Chapter 2

Getting Started

This chapter describes how to install the optional accessories on your Smart Kiosk for optimal serviceability.

Pre-installation Notice

Before you start installing your Smart Kiosk, please read the following notices carefully.

1. The Smart Kiosk does not support PCI cards.
2. Do not plug in or unplug any interior devices, such as memory module or any function card, when the ATX PSU is powered on.
3. The LAN chipset uses RTL 8139/810x family network adapter. The Terminal has been built-in the PXE Boot ROM function within the BIOS to execute Boot ROM already.
4. For installation and compatibility, using the DDR2 RAM Module from the original manufacturer is recommended.
5. The USB device connector is Hot Swap. Do not plug in or unplug any connectors other than USB devices when the power is on.
6. The spill proof design of Smart Kiosk conforms to IP-43 standard (front panel only).
7. Do not insert or remove any devices or components from the Smart Kiosk while the power is on.
8. A bug may be found when installing Windows 2000 from a USB CDROM. When this occurs, please go to the Microsoft website at http://support.microsoft.com/kb/838921 and find the solution.
9. If the thermal printer is RS-232 type, the baud rate MUST set 19200.

Default Setting

Default settings for Smart Kiosk Terminal serial ports

COM1	COM2	COM3	COM4	COM 5	COM 6
IRQ 4	IRQ 3	IRQ 5	IRQ 10	IRQ 5	IRQ 10

Limitations

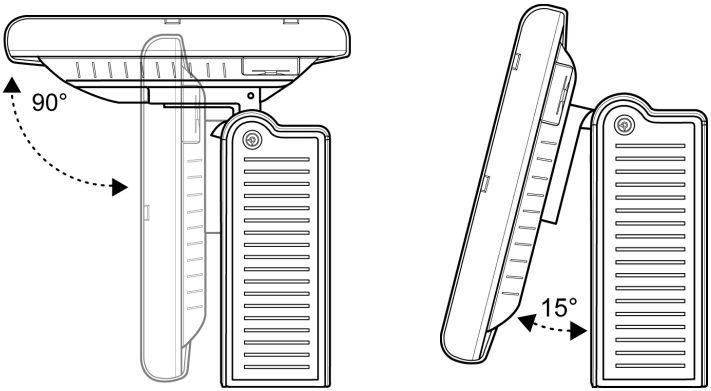
Connector with Voltage Output	Location	Average current	Pack current
COM 2 for Touch Panel interface	LCD Panel Side	DC 5V / 0.3A	DC 5V / 0.5A
COM 3 for extension interface (9th PIN of DB-9)	Bottom Side (On Main Board)	DC 5V / 0.3A, DC 12V / 0.5A	DC 5V / 0.5A, DC 12V / 1A
COM 4 for Modularized Peripherals	Bottom side (On Interface Board)	DC 5V / 0.3A, DC 12V / 0.5A	DC 5V / 0.5A, DC 12V / 1A
COM 5 for Modularized Peripherals	Bottom side (On Interface Board)	DC 5V / 0.3A, DC 12V / 0.5A	DC 5V / 0.5A, DC 12V / 1A
*2nd LCD Monitor Power Connector (DC Plug)	Bottom side (On Interface Board)	DC 12V / 1.5A	DC 12V / 2.5A
*DC 24V for Thermal Printer Power Module	Bottom side (On Interface Board)	DC 24V/ 1.5A	DC 24V / 2A

Note:

- None of the COM Port current loading should exceed DC 5V/3A+ DC 12V/2A.
- When the thermal printer module uses DC 24V, the 2nd Display **CANNOT** use the DC 12V plug simultaneously at the same time. It MUST use a stand-alone DC 12V adapter for 2nd Display.

LCD Operating Angle

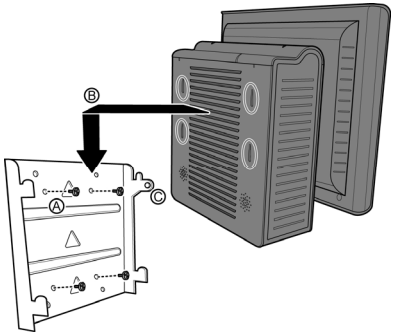
The adjustable LCD display can be tilted to any angle between 0° and 90°. Tilt the LCD display 90° upwards to perform maintenance. Tilt the LCD display 15° upwards for the best operation angle.



Wall Mounting the Smart Kiosk

To wall mount the Smart Kiosk, do the following:

1. Attach the provided wall mounting plate to the wall where you want to mount your Smart Kiosk. Then firmly secure it with four screws as shown (A).
2. Lift your Smart Kiosk and hook it onto the plate as shown (B).
3. Secure the wall mounting plate with a security screw as shown (C).

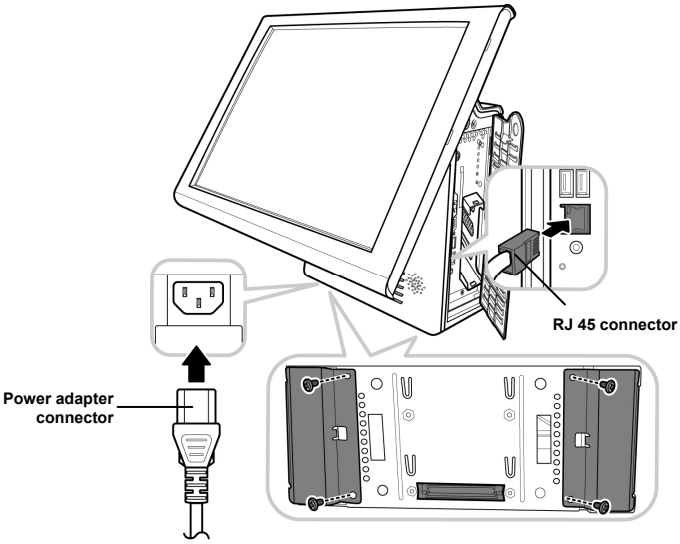


Hardware Installation

Connecting the Power and Internet Cables

To connect the power and Internet cables for the Smart Kiosk, do the following:

1. Open the side panel door.
2. Connect the Internet RJ 45 cable and the power cable to the connectors on the right of the Smart Kiosk as shown.
3. Connect the other end of the power cable to the wall outlet and the Internet cable to an Ethernet network hub.
4. Attach two cable covers to the bottom of the Smart Kiosk, and secure with four screws as shown.

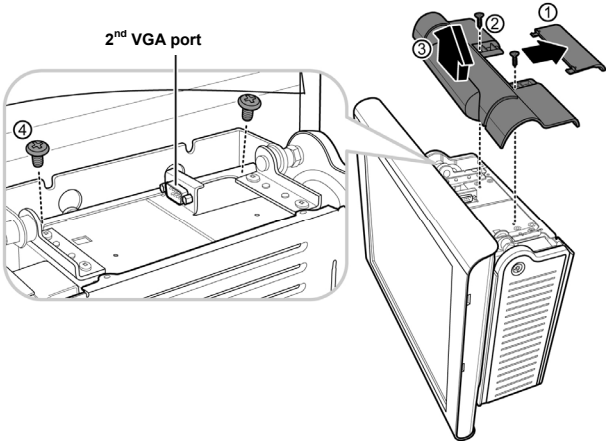


Maintenance

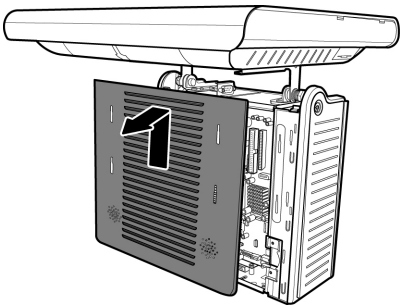
Maintaining Main Board

The main board is covered by the front panel. To remove the main board for maintenance, follow the steps:

1. Remove the screw cover.
2. Release the two screws securing the top cover to the terminal.
3. Remove the top cover as shown.
4. Remove the two screws securing the front panel as shown.



5. Tilt the LCD display upwards to 90 degrees. Move the front panel upwards and remove it in the direction of the arrow as shown.

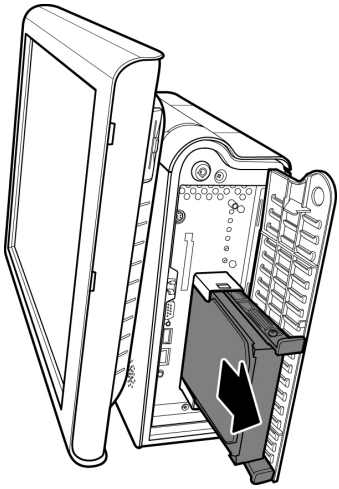


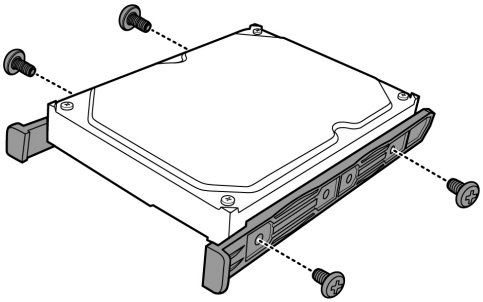
6. Now you can change the jumper settings or remove the main board for maintenance.

Hard Disk Drive Replacement

To replace the hard disk drive, do the following:

1. Open the side panel door on the right side of the Smart Kiosk. Then pull out the hard disk drive.
2. Remove the four screws fixing the HDD brackets on both sides.
3. Replace the hard disk drive with a new one. Then follow the above steps in reverse to complete the procedure.

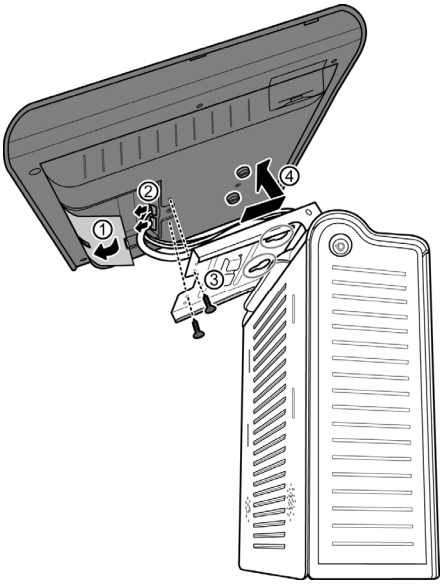




LCD Display Replacement

To replace or upgrade the LCD display on the Smart Kiosk, first adjust the LCD display to an appropriate operating angle. Then follow these steps:

1. Remove the cable cover at the back of the LCD display as shown.
2. Disconnect the two signal cables.
3. Release the two screws fixing the LCD display.
4. Unmount the LCD display from the terminal as shown.



Chapter 3

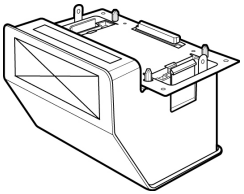
Modularized Peripherals Installation

This chapter describes how to install the optional accessories onto your Smart Kiosk for optimal serviceability.

Modularized Peripheral Options

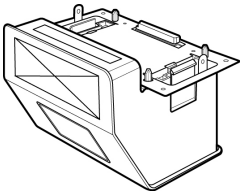
The Smart Kiosk provides a wide range of peripheral options including RFID reader (13.56 MHz or 2.4 GHz), laser scanner, Bluetooth dongle, and thermal printer. The peripheral options can be deployed in a single module, which comes in five different types. In this way, you can simply install one module with multiple applications onto the Smart Kiosk. Each module can either be a stand-alone device or integrated with other applications. Refer to the following for information on each module type and the peripherals they support.

Type A: RFID module



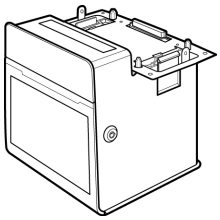
- RFID reader
- Bluetooth dongle

Type B: Laser scanner module



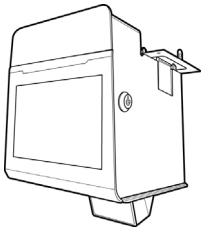
- Laser scanner
- RFID reader
- Bluetooth dongle

Type C: Thermal printer module



- Thermal printer
- Bluetooth dongle

Type D: Thermal printer module with laser scanner

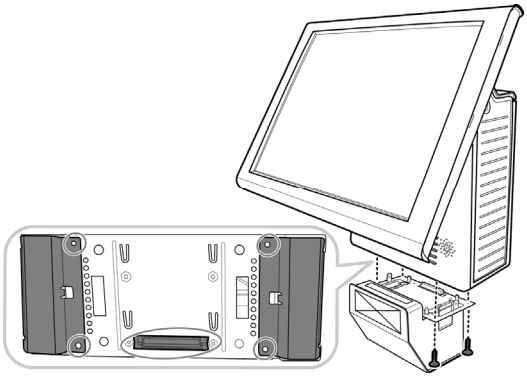


- Thermal printer
- Laser scanner
- Bluetooth dongle

Peripheral Devices Installation

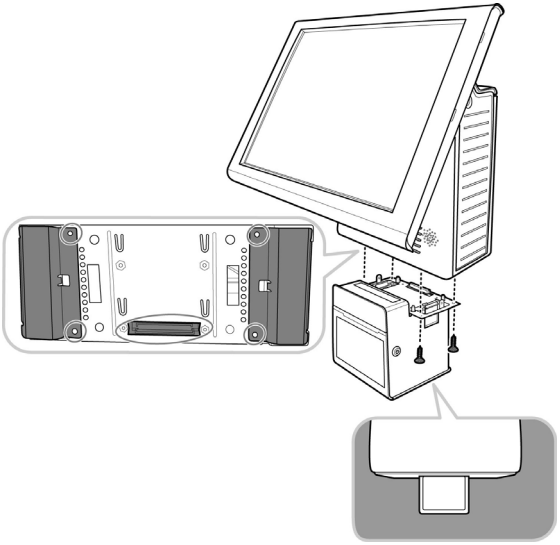
Installing the Standard and Laser Scanner Module

To install the standard and laser scanner module (Type A and B), locate the external connector at the bottom of the Smart Kiosk. Then install the module, replace the cable covers, and secure with four screws as shown.



Installing the Thermal Printer-Based Module

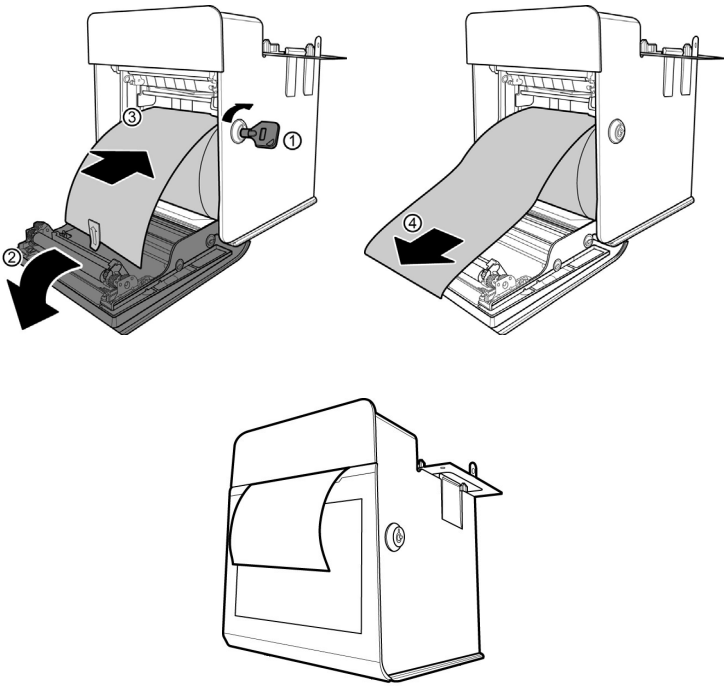
To install the thermal printer-based module (Type C, and D), locate the external connector at the bottom of the Smart Kiosk. Then install the module, replace the cable covers, and secure with four screws as shown.



Installing the Thermal Paper Roll

To feed a paper roll into the thermal printer-based module (Type C, and D), do the following:

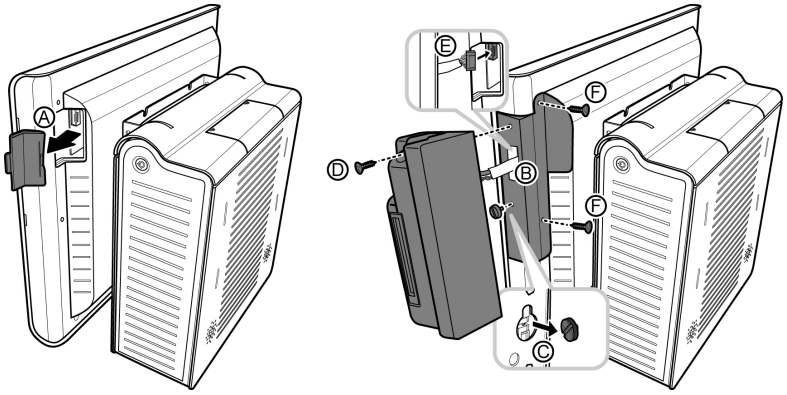
1. Use the supplied key to unlock the module as shown.
2. Pull open the printer cover in the direction of the arrow as shown. If necessary, remove the paper roll remaining in the printer.
3. Tear off the tape from the paper roll and place it into the printer as shown.
4. Pull out approximately 20 cm of paper as shown. This allows the paper to be fed automatically through the paper cutter.
5. Close the printer cover, and it locks automatically.



Installing the MSR/ SCR Device

To install the MSR or SCR device onto the LCD display, do the following:

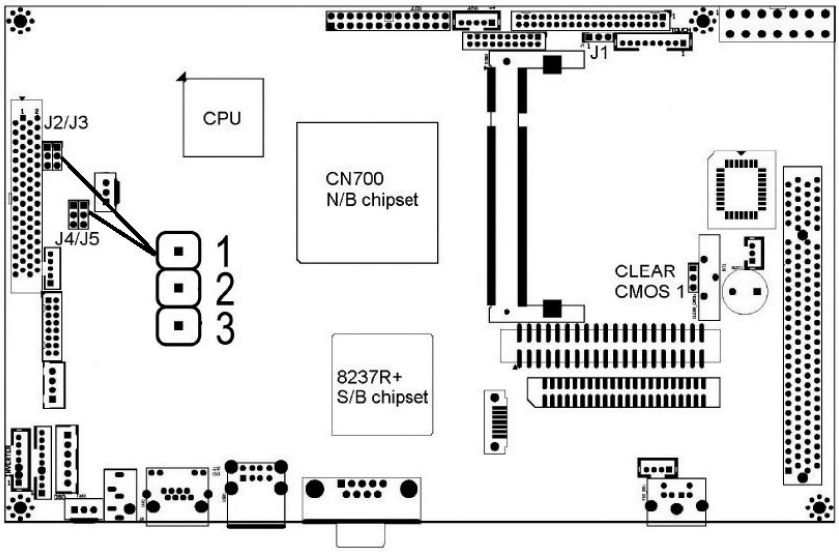
1. Remove the expandable interface cover as shown (A).
2. Thread the MSR/ SCR USB cable through the MSR/ SCR bracket as shown (B).
3. Affix the casing screw to the bracket and attach the MSR/ SCR device onto the casing screw head as shown (C). Then push the MSR / SCR device downwards for locking.
4. Secure the MSR/ SCR device onto the bracket with one M3 screw (D).
5. Connect the MSR/ SCR USB cable to the connector on the right of the LCD display (E).
6. Attach and secure the MSR / SCR device onto the right of the LCD display with the two screws as shown (F).



MSR Notice

1. The MSR default setting is ISO Track 1 & 2. (For customized track settings, advise the manufacturer before production.)
2. In event of any requirement to change the setting of the MSR, run the Setting utility included on the supplied driver CD.
3. The normal swiping card speed of the MSR is 10 to 100 cm/sec. (based on the ISO 7812 standard).

Main Board Jumper Setting



J1 LVDS Voltage Select

Pin 1-2 closed	+5V
Pin 2-3 closed	+3.3V

J2 COM3 (D-sub Pin9) DC Output Select

Pin 1-2 closed	Normal
Pin 2-3 closed	+5V or +12V

J3 COM3 (D-sub Pin9) Voltage Select

Pin 1-2 closed	+5V
Pin 2-3 closed	+12V

J4 COM1 (D-sub Pin9) DC Output Select

Pin 1-2 closed	Normal
Pin 2-3 closed	+5V or +12V

J5 COM1 (D-sub Pin9) Voltage Select

Pin 1-2 closed	+5V
Pin 2-3 closed	+12V

Clear CMOS 1

Pin 1-2 closed	Clear COMS
Pin 2-3 closed	Normal

Appendix

Technical Information

Specifications

ITEM	SPECIFICATION
Model Name	Smart Kiosk POS System
Processor	Supports VIA Eden CPU 1.0 GHz or C7 CPU up to 2.0GHz
Memory	200-pin DDR2 RAM *1, up to 1GB (DDR2 400/533)
System Core Chipset	North Bridge: VIA CN-700 South Bridge: VIA 8237R+
BIOS	Award BIOS with enhanced ACPI 1.0 PnP/APM/DMI/ESCD/PCI bus 2.1/ On Now/ DRAM ECC
AGP 3D Graphics	VIA AGP8X graphics core, shared memory from 16MB up to 64 MB (16MB Default) Dual VGA output (Dual-view on North Bridge Chips) Supports 3D/2D graphics accelerator NT 4.0/5.0, Windows 95/98/2000/XP utility APM/ACPI 1.0 DirectX 9.0, VPE, MPEG2
Serial Port	Total 6 COM port on board, IRQ selectable by BIOS setup Output on 9th pin by jumper selector. Each voltage output with poly switch protector One COM port for Touch Panel control interface Two ports exposed for modularized Kiosk device and peripherals One COM port at the right side (covered by the side panel door) for future use Two COM ports onboard for future use
USB	Total 6 USB port (USB 2.0) support One USB port at bottom side for modularized peripherals Two USB ports at the right side (covered by the side panel door) for future use

Appendix — Technical Information

ITEM	SPECIFICATION
USB	One USB port located inside for Wireless LAN module Two USB ports onboard for future use
Enhance PCI IDE	On board PCI bus master IDE1/2, support Ultra DMA33/66/100/133
Serial ATA Port	One Serial ATA HDD port
Thermal Solution	One heat-sink (fanless) or heat-sink with Fan (Base on Fan Speed Control technology) for CPU and North Bridge Chip
Compact Flash Card	One bootable compact flash card socket (Type I/II)
System Power	DC 24V/ 5A /120W external power adapter with internal DC-to-DC power inverter.
AC Power Source	AC 90 to 264V full range.
System Trigger Control	System front side tact switch (ATX Trigger) below the LCD display with bottom.
Ethernet Port (10/100 Mbps Auto)	Realtek RTL8100CL Ethernet chip on board Intel Ethernet chips on board (10/100 base- T, Gigabyte extendible) ACPI/NT 4.0/5.0 (NDIS5) Remote boot ROM for NT 4.0 Enable or disable by BIOS setup
Audio	VIA VT 1612A AC97 CODEC on board
Keyboard	PS/2
Mouse	PS/2
Wall Mount	VESA standard 100mm
System Size	SKI-120: 305mm (W) x 315mm (H) x 170mm (D) SKI-150: 370mm (W) x 345mm (H) x 182mm (D)
S/W Compatibility	DOS/OS2 V2.1/SCO XENIX: V2.3.2/SCO UNIX V3.2/NOVELL/WIN 3.1/95/98/2000/XP/NT4.0/XPE/WEPOS
Operation Temp.	0°C to 40°C
Storage Temp.	-25°C to 70°C
Optional Device	ISO Trick 1/2/3 Magnetic Stripe Reader
	Smart Card Reader
	Wireless LAN 802.11b/g module

ITEM	SPECIFICATION
Optional Device	Modularized peripherals for Smart Kiosk
	2nd VGA port for LCD Display.

Note:

Specifications are subject to change without notice.

Frequently Asked Questions (FAQ)

Question 1: Why should I do if system appears unstable after updating BIOS?

Answer: Load optimized defaults (or load SETUP Default) after flashing BIOS. If the system remains unstable, clear CMOS to solve the problem.

Question 2: How do I clear CMOS?

Answer: To clear CMOS, do the following:

1. Turn off power and switch off the power adapter.
2. Remove the jumper from clear CMOS 2-3 PIN and insert the jumper to clear CMOS 1-2 PIN.
3. Remove the jumper from clear CMOS 1-2 PIN and re-insert the jumper to clear CMOS 2-3 PIN.
4. Switch on the power again.
5. Press **Delete** to enter CMOS setting and load optimized defaults.
6. Save changes and reboot the system.

Question 3: How do I use Boot Menu?

Answer: To use the Boot Menu, do the following:

1. Press **F9** to enter the Boot Menu.
2. Select the Boot device from the Boot Menu.